

REMARKS

Applicant respectfully requests consideration of the subject application. This Amendment is submitted in response to the Final Office Action mailed October 31, 2005. Claims 1-21 stand rejected. In this Amendment, Claim 1 has been amended.

35 U.S.C. § 103 Rejections

Claims 1-21 are rejected under 35 U.S.C. §103(a) as being unpatentable over Brown, et al., (U.S. Patent No. 6,366,622, hereinafter “Brown”), and further in view of Bollella, (U.S. patent No. 6,466,962, hereinafter “Bollella”). As discussed below, the pending claims are patentable over the above reference.

At least one claim limitation is not taught by the prior art:

As provided in MPEP § 2143.03, to establish prima facie obviousness of a claimed invention, all the claim limitations must be taught or suggested by the prior art. *In re Royka*, 490 F.2d 981, 180 USPQ 580 (CCPA 1974). "All words in a claim must be considered in judging the patentability of that claim against the prior art." *In re Wilson*, 424 F.2d 1382, 1385, 165 USPQ 494, 496 (CCPA 1970).

Claims 1-13

Applicants respectfully submit the cited art fails to teach or suggest at least the following limitation included in claim 1: “a primary host processor coupled to the high-level baseband controller via a harmonized interface, the processor having a first portion to process real-time events received from the controller and associated with the wireless communication protocol, and having a second portion to process non real-time events,

wherein the first portion comprises a real-time event circuit to initiate execution of a real-time event handler.”

Brown is directed to a radio for use in wireless communications and an apparatus and method which uses a radio, modem and controller for implementing wireless communications. Brown includes a digital interface for external communications through which received data and data for transmission is sent, a connection state machine configured to accept commands through the digital interface and to respond to the commands by initiating a sequence, and a receive/transmit state machine configured to perform state control of the radio in response to the initiated sequence.

However, the interface in Brown is not an interface between a wireless primary host processor, having a first portion to process real-time events and a second portion to process non real-time event, and a high level baseband controller that operates a radio module in accordance with a wireless communication protocol, as claimed in the present invention.

In addition, the Examiner acknowledges that “Brown does not specifically teach the use of a processor having different areas for real time and non real time events” and cites Bollella for such teaching, contending it would be obvious to combine Bollella with Brown to produce the present invention. Applicant respectfully disagrees.

Bollella is directed to systems and methods for supporting real-time computing within general purpose operating systems. Bollella uses a multiplexor for each external device to control when and for how long the operating system operates with respect to each external device.

Bollella does not teach a processor having a first portion to process real-time events and a second portion to process non real-time events, wherein the first portion includes a real-time event circuit to initiate execution of a real-time event handler. The

system in Bollella is controlled by the multiplexors, which initiate execution of a real-time event handler. The multiplexors are associated with each of the external devices, and are not included with the processor. Thus, similarly to Brown, Bollella does not teach or suggest having a primary host processor coupled to a high-level baseband controller via a harmonized interface, where the processor has a first portion to process real-time events received from the controller and associated with the wireless communication protocol, and a second portion to process non real-time events, and where the first portion includes a real-time event circuit to initiate execution of a real-time event handler, as claimed in the present invention.

Claims 14-21

Applicants respectfully submit the cited art fails to teach or suggest at least the following limitation included in claim 14: “receiving a real-time event by a transceiver of the computer system from an external device, the event associated with a wireless communication protocol; forwarding the event to the processor; and processing the event in real-time using a real-time event handler initiated by a real-time event circuit within the processor, the processing of the event allowing to maintain the wireless communication protocol and to perform a high-level portion of baseband processing associated with the wireless communication protocol by the processor independent of the operating system.” Similar limitations are included in independent claims 19 and 21.

The Examiner cites Brown for teaching “processing the event in real-time using a real-time event handler initiated by a real-time event circuit within the processor,” at Col. 3, lines 40-55; col. 14, lines 19-40; col 8, lines 22-35 and col. 21, lines 10-24. Applicant has reviewed these citations and has found no teaching in those citations or elsewhere in Brown for processing an event in real-time using a real-time event handler initiated by a real-time event circuit within the processor. As discussed above with respect to claim 1,

Bollella also does not provide a teaching for a real-time event circuit within the processor.

In addition, the Examiner has pointed to no teaching for “the processing of the event allowing to maintain the wireless communication protocol and to perform a high-level portion of baseband processing associated with the wireless communication protocol by the processor independent of the operating system.” Neither Bollella nor Brown provides such a teaching.

The prior art does not suggest the desirability of the claimed invention

MPEP 2143.01 requires that to establish a prima facie case of obviousness, there must be a suggestion or motivation to modify the references. Applicants respectfully submit there is no suggestion or motivation to modify Brown by Bollella to arrive at the invention as presently claimed.

The Examiner submits that it would have been obvious to combine the teachings of Bollella and Brown because Bollella’s events are split into real time and non real-time event and this would improve Brown’s wireless system by allowing real time events to be processed first. However, the Examiner has pointed to no teaching or suggestion in the prior art to motivate one of skill in the art to improve Brown’s wireless system by allowing real time events to be processed first.

There is no teaching or suggestion in Bollella to using radio modules or to wireless communication protocols with their system. In addition, there is no teaching or suggestion in Brown that Brown’s radio module is capable of being coupled to a host processor that can process both real-time and non real-time events.

Examiner’s Response to Arguments

The Examiner submits that the Applicant stated in the Amendment and Response to Office Action dated August 15, 2005, that “a) Bollella does not teach or suggest a processor; b) Bollella and Brown do not teach the use of real-time and non real-time events.”

Applicants respectfully submit the Examiner has mischaracterized the Applicant’s arguments. Applicants did not argue that Bollella fails to teach or suggest a processor. Nor did Applicants argue that Bollella and Brown do not teach the use of real-time and non real-time events.

In contrast, Applicants argued that Bollella and Brown fail to teach or suggest, alone or in combination, a processor having a first portion to process real-time events and a second portion to process non real-time events.

The Examiner has failed to point to a teaching for such a processor having a first portion to process real-time events and a second portion to process non real-time events. Applicants respectfully request that the Examiner point to such a teaching in the cited art.

Thus, the present invention as claimed in claims 1, 14, 19 and 20, and their corresponding dependent claims, is patentable over the above references.

Applicant respectfully requests the withdrawal of the rejection under 35 U.S.C. § 103(a) and submits that the pending claims are in condition for allowance. Applicant respectfully requests reconsideration of the application and allowance of the pending claims.

If the Examiner determines the prompt allowance of these claims could be facilitated by a telephone conference, the Examiner is invited to contact Marina Portnova at (408) 720-8300.

DEPOSIT ACCOUNT AUTHORIZATION

Authorization is hereby given to charge our Deposit Account No. 02-2666 for any

charges that may be due. Furthermore, if an extension is required, then Applicant hereby requests such extension.

Respectfully submitted,

BLAKELY, SOKOLOFF, TAYLOR & ZAFMAN LLP

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